



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/743,567	12/22/2003	Allan T. Koshiol	279.662US1	5068

21186 7590 07/12/2005

SCHWEGMAN, LUNDBERG, WOESSNER & KLUTH, P.A.

P.O. BOX 2938

MINNEAPOLIS, MN 55402-0938

EXAMINER

FAULCON JR, LENWOOD

ART UNIT	PAPER NUMBER
----------	--------------

3762

DATE MAILED: 07/12/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/743,567

Applicant(s)

KOSHIOL ET AL.

Examiner

Lenwood Faulcon, Jr.

Art Unit

3762

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 22 December 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-31 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-31 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 22 December 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date <u>5/9/2005</u> . | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1-10, 16-23 and 28-31 are rejected under 35 U.S.C. 103(a) as being unpatentable over Amely-Velez (US 2002/0107550) in view of Bocek et al. (U.S. Patent No. 5,578,063).

Amely-Velez teaches of a method and apparatus for timing software or hardware events for use within an implantable cardiac rhythm management device, such as a pacemaker and cardioverter/defibrillator capable of performing a plurality of concurrent processes (paragraph 9). Amely-Velez also teaches that the system comprises a programmable microcontroller that includes microprocessor/control circuitry, memory, and logic and timing circuitry (paragraph 33). Amely-Velez further teaches that the microcontroller includes the ability to process or monitor input signals (paragraph 33). Amely-Velez also teaches of sensing circuits being used to determine whether a sensed rhythm is physiologic or pathologic (paragraph 40). Amely-Velez also teaches of a timing control unit that includes two timers and has the ability to receive a clock signal (paragraph 49). Amely-Velez further teaches of the use of marker channel timing (paragraph 36).

Amely-Velez also teaches of the use of telemetry for allowing the implanted device to communicate with an external device, in which acquired data is transmitted to the external device (paragraph 41). Amely-Velez teaches of a data acquisition system that samples cardiac signals through a pairs of electrodes (paragraph 41).

Bocek et al. teaches of an implantable defibrillator and system having multiple channel electrogram telemetry, in which the defibrillator senses electrical activity and applies cardioverting electrical energy to the heart (col. 3 lines 8-18). Bocek et al. further teaches of the use on an external device used for receiving data and displaying such data (col. 6 lines 46-52). Bocek et al. also teaches that the defibrillator includes a microprocessor and a memory (col. 6 lines 11-12). Bocek et al. further teaches of the use of a detection marker generator stage that generates detection markers for storage in the memory portion and further time stamps the markers (col. 7 lines 22-28).

It would have been obvious to one having ordinary skill in the art at the time of the invention to combine the teachings of Amely-Velez with the teachings of Bocek et al. to have an implantable defibrillator that uses markers that indicate a detected event and timestamp the detected event. Amely-Velez and Bocek et al. both teach of implantable defibrillators, and thus teach of analogous arts. It would have been obvious to one having ordinary skill in the art to modify the system as taught by Amely-Velez to include a timestamp for events detected, since this would enhance a user's ability to identify the exact time in which an event occurred. It would have also been obvious to one having ordinary skill in the art at the time of the invention to vary the time measuring window according to the time window a user deemed necessary to analyze and provide

Art Unit: 3762

accurate indications of detected events. Therefore, it would have been obvious to one having ordinary skill in the art at the time of the invention to combine the teachings of Amely-Velez with the teachings of Bocek et al. to have the limitations of claims 1-10, 16-23 and 28-31.

3. Claims 11-15 and 24-27 are rejected under 35 U.S.C. 103(a) as being unpatentable over Amely-Velez (US 2002/0107550) in view of Bocek et al. (U.S. Patent No. 5,578,063) as applied to claims 1-10, 16-23 and 28-31 above, and further in view of Owen et al. (U.S. Patent No. 6,427,083).

Owen et al. teaches of a defibrillation system that compresses data acquired from the patient, in various compression ratios, and further stores the compressed data into memory (col. 22 lines 38-49). Owen et al. further teaches of transmitting patient and defibrillation information to an external source, in which the external interface may comprise a modem link, a network connection or the like, which inherently includes the ability of connecting on a global network (col. 39 lines 9-19).

It would have been obvious to one having ordinary skill in the art at the time of the invention to combine the teachings of Amely-Velez (US 2002/0107550) and Bocek et al. (U.S. Patent No. 5,578,063) as applied to claims 1-10, 16-23 and 28-31 above, with the teachings of Owen et al. to have defibrillation system that compresses data in various ways and have the ability to communicate with a global computer network. Amely-Velez, Bocek et al. and Owen et al. all teach of defibrillation systems that sense and acquire data that is transmitted to an external source, and thus teach of analogous arts. It would have been obvious to one having ordinary skill in the art at the time of the

Art Unit: 3762

invention to modify the systems of Amely-Velez and/or Bocek et al. by compressing the data, which increases the efficiency of the system, by reducing the amount of required memory space without sacrificing the data stored therein, as taught by Owen et al. (col. 22 lines 38-42). It would have also been obvious to one having ordinary skill in the art at the time of the invention to modify the systems of Amely-Velez and/or Bocek et al. by including a global network connection as taught by Owen et al., since it would increase the communication ability of the systems. Therefore, it would have been obvious to one having ordinary skill in the art at the time of the invention to combine the teachings of Amely-Velez, Bocek et al. and Owen et al., to have the limitations of claims 11-15 and 24-27.

Conclusion

4. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Wilson et al. (U.S. Patent No. 5,908,392), Amely-Velez (U.S. Patent No. 6,400,985), Shankar et al. (U.S. Patent No. 6,442,428), Poore et al. (U.S. Patent No. 6,625,488), Amely-Velez (U.S. Patent No. 6,636,765).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Lenwood Faulcon, Jr. whose telephone number is 571-272-6090. The examiner can normally be reached on Monday-Thursday from 9 to 5 pm.


If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Angela D. Sykes, can be reached on 571-272-4955. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Art Unit: 3762

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



Lenwood Faulcon, Jr.



Angela D. Sykes

Supervisory Examiner

ANGELA D. SYKES
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 3700